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NOTICE OF ALLOWANCE AND FEE(S) DUE

26119 7590 06/18/2009 KLARQUIST SPARKMAN LLP 121 S.W. SALMON STREET SUITE 1600

PORTLAND, OR 97204

EXAMINER
WEL ZHENG
ART UNIT PAPER NUMBER
2192
DATE MAILED 06(18/2009

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/693,834	10/24/2003	Trishul Chilimbi	3382-66135-01	1003	
TITLE OF INVENTION: ADAPTIVE INSTRUMENTATION RUNTIME MONITORING AND ANALYSIS					

 APPLN TYPE
 SMALL ENTITY
 ISSUE FEE DUE
 PUBLICATION FEE DUE
 PREV, PAID ISSUE FEE
 TOTAL FEE(S) DUE
 DATE DUE

 nonprovisional
 NO
 \$1510
 \$300
 \$0
 \$1810
 09/18/2009

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION ON THE MERITS IS CLOSED. THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED. SEE 35 U.S.C. 1SI. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

HOW TO REPLY TO THIS NOTICE:

I. Review the SMALL ENTITY status shown above.

If the SMALL ENTITY is shown as YES, verify your current SMALL ENTITY status:

A. If the status is the same, pay the TOTAL FEE(S) DUE shown above.

B. If the status above is to be removed, check box 5b on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and twice the amount of the ISSUE FEE shown above, or

If the SMALL ENTITY is shown as NO:

A. Pay TOTAL FEE(S) DUE shown above, or

B. If applicant claimed SMALL ENTITY status before, or is now claiming SMALL ENTITY status, check box 5a on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and 1/2 the ISSUE FFE: shown above.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail Mail Stop ISSUE FEE Commissioner for Patents P.O. Box 1450 Alexandria, Virginia 22313-1450

or Fax (571)-273-2885

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where

appropriate. All further correspondence including the Patent, advance orders and notification indicated unless corrected below on derived otherwise in Block 1. by (a) speculying a new individual for including the patent of the				Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing or transmission.					
				have	rs. Each additions its own certificate	of ma	', such as an assignme iling or transmission.	nt or format dra	wing, must
				Certificate of Mailing or Transmission I hereby certify that this Fee(s) Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Mail Stop ISSUE FEE address above, or being facsimile transmitted to the USPIO (571) 272-2885, on the date indicated below.					
PORTLAND, O	R 97204							(Dep	ositor's name)
									(Signature)
									(Date)
APPLICATION NO.	FILING DATE		FIRST NAMED INVEN	TOR		ATTO	RNEY DOCKET NO.	CONFIRMATI	ON NO.
10/693,834	10/24/2003	•	Trishul Chilimbi	i		3	382-66135-01	1003	
TITLE OF INVENTION	: ADAPTIVE INSTRU	MENTATION RUNTIMI	E MONITORING AN	D AN	ALYSIS				
APPLN, TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE I	OUE	PREV. PAID ISSU	E FEE	TOTAL FEE(S) DUE	DATE I	DUE
nonprovisional	NO	\$1510	\$300		\$0		\$1810	09/18/2	1009
EXAM	INER	ART UNIT	CLASS-SUBCLASS	3					
WEI, 2		2192	717-130000						
I. Change of correspondence address or indication of "Fee Address" (ST I. 1863). Change of correspondence address (or Change of Correspondence Address form FIOSH 122) attached. J Fee Address "indication (or "Fee Address" Indication form FIOSH 47; Rev 03-02 or more recent) attached. Use of a Custome Number is required.			2. For printing on the patent front page, list (1) the aames of up to 3 registered patent attorneys or agents OR, alternatively (2) the names of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent ancessay or agent. If no name is illied, no name will be praised.						
PLEASE NOTE: Un recordation as set fort (A) NAME OF ASSI	less an assignee is ident th in 37 CFR 3.11. Comp GNEE	A TO BE PRINTED ON iffied below, no assignee pletion of this form is NO	data will appear on t T a substitute for filin (B) RESIDENCE: (C	he pa g an a	atent. If an assign assignment. and STATE OR (COUNT	TRY)		
Please check the appropr	riate assignee category or	categories (will not be p	rinted on the patent):	_	Individual G	orporati	ion or other private gro	up entity 🖵 G	overnment
4a. The following fee(s) are submitted: Issue Fee Publication Fee (No small entity discount permitted) Advance Order - # of Copies			4b. Payment of Fec(s): (Please first reapply any previously paid issue fee shown above) A check is enclosed. Payment by credit card. Form PTO-2038 is attached. The Director is hereby authorized to charge the required fee(s), any deficiency, or credit any overpayment, to Depoist Account Number (enclose an extra copy of this form).						
	is SMALL ENTITY state	us. See 37 CFR 1.27.					IITY status. Sec 37 Cl		
NOTE: The Issue Fee an interest as shown by the	d Publication Fee (if req records of the United Sta	uired) will not be accepte ites Patent and Trademark	ed from anyone other the Office.	han th	he applicant; a reg	istered.	attorney or agent; or th	e assignee or oth	ner party in
Authorized Signature					Date				
Typed or printed name			Registration No.						
This collection of inform an application. Confiden submitting the complete this form and/or suggest Box 1450, Alexandria, V Alexandria, Virginia 223	nation is required by 37 C tiality is governed by 35 d application form to the ions for reducing this bu /irginia 22313-1450. DC 313-1450.	CFR 1.311. The informatic t U.S.C. 122 and 37 CFR USPTO. Time will vary rden, should be sent to the D NOT SEND FEES OR	on is required to obtain 1.14. This collection is y depending upon the te Chief Information C COMPLETED FORM	n or n is esti indiv Office IS TO	etain a benefit by i imated to take 12 idual case. Any co r, U.S. Patent and D'THIS ADDRES!	the pub minute omment Trader S. SEN	lic which is to file (and s to complete, includin s on the amount of tin nark Office, U.S. Depo D TO: Commissioner	by the USPTO g gathering, pre- ne you require to urtment of Comr for Patents, P.O.	to process) paring, and o complete nerce, P.O. Box 1450,

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26119	7590 06/18/2009		EXAM	UNER	
KLARQUIST SPARKMAN LLP			WEI, ZHENG		
121 S.W. SALMON STREET			ART UNIT	PAPER NUMBER	
SUITE 1600 PORTLAND, OR 97204		2192 DATE MAILED: 06/18/200	9		

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b)

(application filed on or after May 29, 2000)

The Patent Term Adjustment to date is 539 day(s). If the issue fee is paid on the date that is three months after the mailing date of this notice and the patent issues on the Tuesday before the date that is 28 weeks (six and a half months) after the mailing date of this notice, the Patent Term Adjustment will be 539 day(s).

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (http://pair.uspto.gov).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 or (571)-272-4200.

Application No. Applicant(s) 10/693.834 CHILIMBI ET AL. Notice of Allowability Examiner Art Unit ZHENG WEI 2192 -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS. This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308. This communication is responsive to 04/13/2009. 2. The allowed claim(s) is/are 1, 2, 7-10 and 26-44 (re-numbered as 1-25). 3. Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) \square All b) Some* c) None of the: 1. Certified copies of the priority documents have been received.

2. Certified copies of the priority documents have been re-	eived in Application No					
3. Copies of the certified copies of the priority documents	3. Copies of the certified copies of the priority documents have been received in this national stage application from the					
International Bureau (PCT Rule 17.2(a)).						
* Certified copies not received:						
Applicant has THREE MONTHS FROM THE "MAILING DATE" of this co noted below. Failure to timely comply will result in ABANDONMENT of t THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.						
4. A SUBSTITUTE OATH OR DECLARATION must be submitted. Not INFORMAL PATENT APPLICATION (PTO-152) which gives reason						
5. CORRECTED DRAWINGS (as "replacement sheets") must be subr	nitted.					
(a) I including changes required by the Notice of Draftsperson's Pate	ent Drawing Review (PTO-948) attached					
 hereto or 2) to Paper No./Mail Date 						
(b) including changes required by the attached Examiner's Amendr Paper No./Mail Date	nent / Comment or in the Office action of					
Identifying indicia such as the application number (see 37 CFR 1.84(c)) sheach sheet. Replacement sheet(s) should be labeled as such in the header	ould be written on the drawings in the front (not the back) of according to 37 CFR 1.121(d).					
 ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIG attached Examiner's comment regarding REQUIREMENT FOR THE 						
Attachment(s)	_					
Notice of References Cited (PTO-892)	Notice of Informal Patent Application					
2. Notice of Draftperson's Patent Drawing Review (PTO-948)	 Interview Summary (PTO-413), Paper No./Mail Date 					
3. ☑ Information Disclosure Statements (PTO/SB/08), Paper No./Mail Date 04/13/2009	7. Examiner's Amendment/Comment					
Examiner's Comment Regarding Requirement for Deposit of Biological Material	8. X Examiner's Statement of Reasons for Allowance					
	9. Other					
	/Tuan Q. Dam/					
	Supervisory Patent Examiner, Art Unit 2192					
AO.						

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DETAILED ACTION

1. This office action is in response to the application filed on 04/13/2009.

- Claims 3-6 and 11-25 have been cancelled.
- Claims 26-44 have been added.
- 4. Claims 1 and 7 have been amended.
- Double patenting rejection over US 7,140,008 in view of Chilimbi to claims 1, 6,
 18, and 23 is withdrawn in view of Applicants' cancellation, amendment and arguments.
- Double patenting rejection over co-pending application 10/892,260 to claims 1, 6,
 13, 18 and 23 is withdrawn in view of Applicants' cancellation, amendment, and filed/approved Terminal Disclaimer.
- 35 U.S.C. § 112 rejection to claims 12 and 18-22 is withdrawn in view of Applicants' cancellation of the claims.
- Claims 1, 2, 7-10 and 26-44 remains pending and now are allowed (re-numbered as 1-25).

Information Disclosure Statement

The information disclosure statements filed 04/13/2009 has been placed in the application file and the information referred to therein has been considered.

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Allowable Subject Matter

10. As the Applicants pointed out under REMAKRS section, page number 13-16, the cited art (Wu and Chilimbi) taken either separately or in combination, fails to teach or suggest all limitations about "... tracking a frequency of execution of the code paths; when a code path is to be executed, determining to dispatch execution into the instrumented version code path at a sampling rate for the respective code path and otherwise into the original version code path such that. for a given sampling rate, a ratio of a number of executions of the instrumented version code path to a total number of executions of both the instrumented version code path and the original version code path is equivalent to the given sampling rate; adapting the sampling rate for the code paths according to the frequency of execution of the code paths, such that, after adapting, the ratio of a number of executions of the instrumented version code path to a total number of executions of the code path is equivalent to the adapted sampling rate, wherein the sampling rate for executing the code paths is adapted such that the adapted sampling rate is inversely related to the frequency of execution of the code paths; storing instrumentation data obtained by execution of the instrumented version of the software ..." and reporting all objects, variables memory accesses for detecting memory leaks, data racing and incorrect memory accessing, and in as such manners as recited in the independent claims 1, 7, 29, 33, 37 and 41, thus each of the dependent claims are allowable for at least the same reasons.

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11. Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

Any inquiry concerning this communication or earlier communications from examiner should be directed to Zheng Wei whose telephone number is (571) 270-1059 and Fax number is (571) 270-02059. The examiner can normally be reached on Monday-Thursday 8:00-15:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Tuan Q. Dam can be reached on (571) 272-3695. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Any inquiry of a general nature of relating to the status of this application or proceeding should be directed to the TC 2100 Group receptionist whose telephone number is 571- 272-1000.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic

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Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Z. W./ Examiner, Art Unit 2192 /Tuan Q. Dam/ Supervisory Patent Examiner, Art Unit 2192